



U.S. Department
of Transportation
**Research and
Special Programs
Administration**

400 Seventh St., S.W.
Washington, D.C. 20590

NOV 12 2002

DOT-E 10519
(FOURTH REVISION)

EXPIRATION DATE: December 31, 2003

(FOR RENEWAL, SEE 49 CFR § 107.109)

1. GRANTEE: Canadian Liquid Air Ltd., Montreal, Quebec
(U.S. Agent: Air Liquide America L.P.
Houston, TX)
2. PURPOSE AND LIMITATION:
 - a. This exemption authorizes the use of a non-DOT specification full opening hinged head, steel salvage cylinder with a teflon lining of approximately 101 gallons (382 liters) capacity for overpacking damaged or leaking packages of pressurized and non-pressurized hazardous materials described in paragraph 6 below. This exemption provides no relief from the Hazardous Materials Regulations (HMR) other than as specifically stated herein.
 - b. The safety analyses performed in development of this exemption only considered the hazards and risks associated with transportation in commerce.
3. REGULATORY SYSTEM AFFECTED: 49 CFR Parts 106, 107 and 171-180.
4. REGULATIONS FROM WHICH EXEMPTED: 49 CFR §§ 173.301, 173.40, 173.154, 173.192, 173.193, 173.201, 173.202, 173.203, 173.226, 173.227, 173.245, 173.247, 173.302a, and 173.304a, except as specified herein.
5. BASIS: This exemption is based on the application of Canadian Liquid Air Ltd., dated December 13, 2001, submitted in accordance with § 107.109 and a supplemental letter dated October 1, 2002, submitted in accordance with § 107.105.

the salvage cylinder and is trained and experienced in the use of the inspection and testing equipment. Records of retest must be made available to a DOT representative upon request.

j. OPERATIONAL CONTROLS - Each salvage cylinder must be secured to the motor vehicle by a securement system that conforms with the requirements contained in §§ 393.100 to 393.106.

k. MARKING - Each salvage cylinder must be plainly marked on both sides near the middle, in letters at least 2 inches high on a contrasting background "DOT-E 10519" and "SALVAGE CYLINDER".

9. MODES OF TRANSPORTATION AUTHORIZED: Motor vehicle.
10. MODAL REQUIREMENTS: A current copy of this exemption must be carried aboard each motor vehicle used to transport packages covered by this exemption.
11. COMPLIANCE: Failure by a person to comply with any of the following may result in suspension or revocation of this exemption and penalties prescribed by the Federal hazardous materials transportation law, 49 U.S.C. 5101 et seq:
 - o All terms and conditions prescribed in this exemption and the Hazardous Materials Regulations, 49 CFR Parts 171-180.
 - o Registration required by § 107.601 et seq., when applicable.

Each "Hazmat employee", as defined in § 171.8, who performs a function subject to this exemption must receive training on the requirements and conditions of this exemption in addition to the training required by §§ 172.700 through 172.704.

No person may use or apply this exemption, including display of its number, when the exemption has expired or is otherwise no longer in effect.

Continuation of DOT-E 10519 (4th Rev.)

Page 2

6. HAZARDOUS MATERIALS (49 CFR § 172.101):

Proper Shipping Name/ Hazardous Materials Description	Hazard Class/ Division	Identi- fication Number	Packing Group
Various materials under appropriate proper shipping name authorized in Specification cylinders (except acetylene)	2.1, 2.2, 2.3, 3, 5, 6.1, 8	As applic- able	As applic- able

7. SAFETY CONTROL MEASURES:

a. Prescribed packaging is a full opening hinged head non-DOT specification, steel salvage cylinder of welded construction with provisions for securely positioning damaged cylinders and safely draining contents of the cylinders placed therein. The salvage cylinder must be designed, constructed and "U" stamped in accordance with Section VIII Division I of the ASME Code for a maximum allowable working pressure (MAWP) of 1376 psig.

b. In addition, the salvage cylinder must conform with Robert Mitchell Inc. drawing numbers F-6617 sheet 1/3 rev. 4; sheet 2/3 rev. 3; sheet 3/3 rev. 3; F-6617A sheet 1/1 rev. 1; other drawing and technical specifications on file with the Office of Hazardous Materials Exemptions and Approvals (OHMEA) and the following:

Volume	13.5 cu. ft., 101 gals., (382 liters)
Material (Shell and Heads)	ASME SA-516-70N or equivalent carbon steel
Design stress	Per ASME Code, minimum safety factor of 4:1
Design temperature range	-50.0°F to 180°F
Design service pressure	1376 psig at 180°F
Hydrostatic Test pressure	2220 psig
Outside diameter	22 inches
Length	8 feet 5.25 inches
Sidewall thickness	1.00 inch
Tare Weight	4500 lbs
Weight full of water	5350 lbs
Openings on sidewall:	Four (4) - 0.5 inch diameter welded fittings as follows:
Purge valve	one (1)
Pressure gauge	one (1)

Continuation of DOT-E 10519 (4th Rev.)

Page 3

Bottom drain valve	one (1)
Pressure relief valve	one (1) pressure relief valve set at 1300 psig.

8. SPECIAL PROVISIONS:

a. Drivers and persons who load/unload or transport the salvage cylinders must have been trained in handling and loading/unloading the salvage cylinder.

b. Damaged cylinders containing liquefied gases with a vapor pressure exceeding 1376 psig at 70° F are not authorized.

c. The nonliquefied gases in damaged cylinders to be transported must be limited in pressure and volume so that if totally discharged into the salvage cylinder the pressure at 70° F will not exceed 1376 psig.

d. Each salvage cylinder must be labeled as prescribed for the material in the damaged cylinder.

e. Each salvage cylinder must be cleaned and purged after each use.

f. Transportation is limited to motor vehicles owned or leased by the holder of this exemption or owned or leased by contract carriers employed by the holder of this exemption. Carriers transporting cylinders authorized under the terms of this exemption must hold a "Conditional" or "Satisfactory" safety rating as prescribed in 49 CFR Part 385.

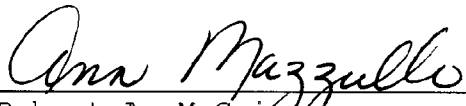
g. A person who is not a holder of this exemption who receives a package covered by this exemption may reoffer it for transportation provided no modification or change is made to the package or its contents and it is reoffered for transportation in conformance with this exemption and the HMR.

h. A current copy of this exemption must be maintained at each facility where the package is offered or reoffered for transportation.

i. TESTING - At least once every 2 years, each cylinder must be visually reinspected (internally and externally) and hydrostatically retested at 2220 psig. The retest and inspection must be made by an employee that is familiar with

12. REPORTING REQUIREMENTS: The carrier is required to report any incident involving loss of packaging contents or packaging failure to the Associate Administrator for Hazardous Materials Safety (AAHMS) as soon as practicable. (Sections 171.15 and 171.16 apply to any activity undertaken under the authority of this exemption.) In addition, the holder(s) of this exemption must inform the AAHMS, in writing, of any incident involving the package and shipments made under the terms of this exemption.

Issued in Washington, D.C.:


for Robert A. McGuire
Associate Administrator for
Hazardous Materials Safety

NOV 12 2002

(DATE)

Address all inquiries to: Associate Administrator for Hazardous Materials Safety, Research and Special Programs Administration, Department of Transportation, Washington, D.C. 20590.
Attention: DHM-31.

Copies of this exemption may be obtained by accessing the Hazardous Materials Safety Homepage at <http://hazmat.dot.gov/exemptions> Photo reproductions and legible reductions of this exemption are permitted. Any alteration of this exemption is prohibited.

PO: alb